

## WETLANDS WORKGROUP

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Workgroup meetings have been held on April 11, 2006; May 31, 2006; July 17, 2006; and Sept. 29, 2006. The **NEXT MEETING** is scheduled for Monday, October 31, 2006 at the SF Bay Water Board, 1515 Clay Street, 14<sup>th</sup> Floor, Room 1411 from 1PM-4 PM. Meeting summaries from earlier meetings are posted below.

**CCMP UPDATE – WETLANDS WORKGROUP**  
Tuesday, April 11, 2006, 1:00 PM  
Room 1411, State Building, 1515 Clay Street, Oakland

**MEETING SUMMARY**

Present: Mike Monroe, Luisa Valiela, Andree Breaux, Nicole Dobroski, Arthur Feinstein, Beth Huning, Steve McAdam, Karen McDowell, Chris Potter, Drew Talley, Marcia Brockbank, Joan Patton, Paula Trigueros.

Mike Monroe welcomed everyone and led a roundtable of introductions. He and Luisa presented the **Agenda** for today's meeting: Welcome & Intros; Review Mission and Ground Rules; Brainstorm Post-CCMP "Positives" and "Challenges"; Review Actions; Brainstorm New CCMP Actions; Wrap-up and Assignments.

The **Mission Statement** was presented: Update the CCMP; With Time & Resources Available; Use a 10-year time frame; Target Date of May 2007 for Implementation Committee Adoption. Marcia Brockbank provided background for the Up-date; the recent biennial Implementation Review by EPA Headquarters noted the CCMP was 12 years old and recommended an Up-date. The Friends of the Estuary has been reviewing the program areas and also recommended updating. She stressed the main guideline is to determine what is missing to make the CCMP more effective.

**Ground Rules** for Meetings: Take turns speaking; No attacks/put-downs; Listen actively; Be on-time; Participate fully; Do homework; Bring reference materials; Define acronyms.

**Post CCMP Accomplishments**

The group identified actions/accomplishments that have occurred around the Estuary since the CCMP was adopted in 1993:

- Habitat Goals Report (directly from CCMP)
- Increased enforcement penalties (BCDC)
- Updated wetlands, fish & wildlife; mitigation policies (BCDC)
- Started Subtidal Goals Project (BCDC and partners)
- "Managed wetlands" (duck clubs, diked wetlands) project beginning (BCDC)
- Coastal Conservancy's "Bay Program"
- State's Wetlands Conservation Policy
- Phasing out "In-lieu" fees (for mitigation)
- Acquisition of Salt Ponds (North Bay and South Bay)
- Region 2 No-Net Loss Policy in the Basin Plan
- Consistent wetlands definition and delineation in Basin Plan
- Wetlands Alteration Policy in 401(b)(3) Guidelines
- JARPA
- Fairly uniform mitigation policies
- Wetlands Restoration Program's Design Review Group
- Wetlands Monitoring Group still meets
- Wetlands Monitoring – SFEI (CRAM)
- \$8 million to work on Skaggs Island

- Public support for coastal projects is high
- LTMS got us Hamilton, Bel Marin Keys, Montezuma
- People are more informed about Bay & science of Bay
- NERR (National Estuarine Research Reserve) for SF Bay (26<sup>th</sup> in U.S.)
- EPA/COE mitigation banking policies
- Bay-Delta Authority (Ecosystem Restoration Program/Suisun Marsh Charter Group)
- SFO didn't build new runways
- Spartina Program
- Localized information that South Bay may not be sediment deficient

### **Post CCMP Challenges**

The group identified actions/activities that haven't gone as well as they could have:

- Regional Wetlands Management Plan never happened
- 404 Assumption by State never happened (pilot failed)
- Seasonal wetlands not adequately addressed
- Riparian habitats not addressed
- Wetlands Regional Restoration Program not institutionalized
- Mitigation Bank placement in watersheds
- Wetlands Project tracking (acreage/losses/types)
- Monitoring and assessment for wetland restoration projects based on performance criteria
- Suisun Marsh has no enforcement penalties
- State Budgets (BCDC budget cut in each of last 3 years; lost 17 out of 39 positions – cuts at Regional Board and DFG also)
- Mercury issues
- Incomplete acquisition of SF Bay National Wildlife Refuge (need 10-15,000 additional acres in South Bay)
- SFO/OAK runway expansion
- Bay-Delta Authority
- Spartina spread
- Sediment budget issues (is there a deficit in the Bay?)
- Upland wetlands – key habitats – functional ecological importance of upland wetlands
- BCDC cannot protect animals in shoreline band
- Sea level rise

### **Review of CCMP Actions**

The group reviewed the Wetlands action items in the CCMP and recommended changes/no changes, as noted below:

#### **WT-1.1: Prepare Regional Wetlands Management Plan**

Plan is a component of a recommended program stated in the Objective.

Won't get better plan out of Sacramento, so leave action as is; doesn't do any harm; 6 actions covered by Habitat Goals report, but emphasis is on Bay tidal wetlands.

**Recommended Change: Change word in objective from “plan” to “program”**

**Recommended Change:** Emphasize regional or sub-regional planning efforts (e.g., Suisun Marsh).

**Recommended Change:** Need to consider all wetlands, including seasonal wetlands and moist grasslands; add riparian and vernal pools; need new action items for transitional habitats.

**WT-1.2:** Encourage geographically focused cooperative efforts to protect wetlands

**Recommended Change:** Add Joint Venture to “Who” list

**WT-2.1:** Establish Comprehensive State Wetlands Program

**Recommended Change:** Add new action item regarding SWANCC decision?

**WT-2.1.1:** Establish state wetlands protection policies for the Estuary

A. and B. have been accomplished by Region 2 Water Board.

C. Emphasize giving Delta Protection Commission permit authority.

D. Emphasize buffer areas in CCMP up-date.

**WT-2.1.2:** State assumption of 404

Did not happen, but Region 2 Water Board evaluated this action; item is complete.

Mention in Preface to CCMP update.

**WT-2.2:** Increase Enforcement & Permit Compliance

OK as is.

**WT-2.3:** Develop & Adopt Uniform Mitigation Policy

For mitigation banks, check geographic extent of service areas, segments, etc. Use EPA/Corps proposed rule definitions, including use of Hydrological Unit Codes.

**Recommended Change:** This action needs to be cross-checked with the EPA/COE proposed mitigation rule.

**WT-2.4:** Improve Wetland Protection Under CWA

OK as is.

**WT-3.1:** Expand/Create New Acquisition Program

Some acquisition/refuge expansion has happened. National Park Service is good with life estate acquisition. Encourage state funding for acquisition – new bond money.

**Recommended Change: Add Joint Venture to “Who”**

**WT-3.2: Expand Fin/Tech Assistance to Land owners**

Is this an appropriate place to highlight education of public re: value of wetlands?

OK as is.

**WT-3.3: Encourage Wetland Protection By-Laws**

Put in originally in concert with “Save the Bay” ordinance

OK as is.

**WT-4.1: Identify & restore non-wetland areas to wetland/riparian**

Non-wetland text is unclear...meaning uplands? Is it meant to encourage purchase and restoration of farmland? Clarify language regarding acquisition/restoration.

**Recommended Change: Revise language to clarify meaning. For historic wetland habitat, use “re-establish” or “rehabilitate”**

**New Actions**

- Prevent non-native species establishment in restoration or mitigation projects.
- Address habitat connectivity: relations between habitats: buffer/transitional habitats down to the water line.
- Address amphibians that need habitats with isolated ponds – do we have these critters?
- Address entire wetland ecosystem including vernal pools; emphasize ecological integrity; concept of wetland complexes.
- Address methyl mercury issues particular to wetland restoration.
- Improve and coordinate project and permit tracking and data bases (SFEI’s tracker, Joint Venture database, Coastal Conservancy database). Need latitude/longitude; performance criteria; emphasize accessibility.
- Redefine research needs. Do we need studies that help ID needs – we don’t know all we need to know – where does one go to access current science? Where does SFEI fit in?
- Need more small-scale watershed planning to ensure mitigation projects remain within affected watershed and functions are restored to that watershed.
- Need mitigation banks for more types of habitat.
- Developing stream protection policies (Regional Water Boards 1 & 2)
- Adopt workable mitigation policies for optimal restoration identifying clear cut objectives, monitoring requirements, and using adaptive management.
- Address infrastructure barriers to restoration (i.e., railroads, CALTRANS, pipelines).
- Wetland Regional Monitoring program – Regional Water Board must require monitoring as part of storm water permitting.

### **Parking Lot Issues**

- Riparian vegetation
- Vernal pools, moist grasslands (use term “non-tidal?”)
- Transitional Habitats/Buffers (2.1.1.D-Review)
- SWANCC/isolated waters
- Establish a Delta Conservancy
- Particular Issues Related to the Delta – How to Capture the “URGENCY”?
- Need to decide whether the CCMP update will address priorities.
- Check terminology in Mitigation Item (re-establish; rehabilitate; restore; etc.) – particularly in WT-2.3.
- Public involvement and education related to wetlands, especially update economic value of wetlands. Check where this fits.
- Invasive species and wetlands
  - Issue relates to mitigation sites
  - Highlight issues specific to restoration and invasive species
- Sea level rise

### **Assignments**

**WT-1.1:** Revise (minor): Paula

**WT-1.2:** Review/Revise: Beth Huning, Chris Potter

**WT-2.3:** Review: Andree Breau, Arthur Feinstein, Chris Potter

**WT-3.1:** Revise (minor) Paula

**WT-4.1:** Review/Revise: Beth Huning, Chris Potter

**NEXT MEETING: WEDNESDAY, MAY 31, 2006 1 PM-4 PM 1515 Clay St.,  
Oakland**

**CCMP UPDATE – WETLANDS WORKGROUP**  
Wednesday, May 31, 2006, 1:00 PM  
Room 1411, State Building, 1515 Clay Street, Oakland

**MEETING SUMMARY**

Present: Mike Monroe, Luisa Valiela, Bob Bathe, Andree Breaux, Nicole Dobroski, Arthur Feinstein, Beth Huning, Steve McAdam, Karen McDowell, Barbara Salzman, Drew Talley, Marcia Brockbank, Joan Patton, Paula Trigueros.

The Agenda for today's meeting was reviewed: Introductions; Review April Meeting Summary; Report Out on Assignments; Review Potential New Action Items; New Assignments; Wrap Up.

**Report Outs:**

New language for **Objective WT-1:** (Paula):

**Objective WT-1:** Create a comprehensive, Estuarywide wetlands management program. [Each of the subsequent objectives would be components of the program.]

New language for **Action WT-1.2** (Beth Huning/Chris Potter)

Beth presented proposed new language; there was discussion and Beth will revise and email to the group.

**Action WT 2.3: Develop and adopt uniform compensatory mitigation policies.** (Andree, Arthur, Chris to review in light of Corps rules, USGS hydrologic codes): There was discussion of the Corps' policy for mitigation; it was recommended that "within the affected watershed" be added to item A.1. Steve McAdam will send updated BCDC mitigation policy to Andree. It was recommended the language under **What:** be updated in light of other language on mitigation banking. Language should add restore; change value to function; add monitoring of mitigation projects under this action. HUC assigned to Potter.

**Action WT-3.1: Expand wetlands acquisition programs, or establish a new Estuary-specific wetlands acquisition program.** Under **Who** add SF Bay Joint Venture and add brief description under **What**.

**Action 4.1** (Beth, Chris P): New language not yet drafted.

**Review Potential New Actions:**

1. Buffer/transitional habitats/ecosystem integration : There was a long discussion on concepts of habitat connectivity; transitional habitats; aquatic habitat. While item D. in Action WT-2.1.1 includes buffers, this needs to be emphasized in separate action items, first to recognize the importance of transitional zones because of their importance as habitat, and secondly to ensure there are buffers between habitat areas and between development and other land uses. Key questions discussed included:

- Do we want to separate concepts of buffers and transitional habitats?
- Does transitional include upper habitat?
- Action should start off with concept of ecological integrity.
- Amphibians need uplands/pond complexes.
- Buffers/transitional habitats are different but related—prefers term habitat connectivity or habitat mosaic.
- Connectivity does not translate the habitat value of each habitat in and of itself—only that they need to be connected.
- Protecting “transitional” areas is because of their habitat value.
- Must ensure there are buffers side by side with habitat areas and developed areas and other land uses.
- Use CRAM methodology to review concepts.

A **subgroup** was formed to develop **Action** language for this new/expanded action;  
**Anitra, Andree, Drew, and Arthur.**

2. Seasonal Wetlands/Vernal Pools : It was agreed there needs to be an **Action** for seasonal wetlands. Also, need to add wider discussion in Wetlands problem statement of seasonal wetlands. There needs to be a discussion of the different types of seasonal wetlands in a new introductory paragraph including vernal pools, seeps (reference CRAM) and defined in the Goals Report. Potential action: Map, Identify them, and identify Need.

**Subgroup** for development of item: **Barbara and Arthur.** Keys:

- 2<sup>nd</sup> Round NWI mapping dies include some seasonal wetland types
- Joint Venture has started revising acreage goals for seasonal wetlands.
- Make it clear that we want same level of protection for seasonal wetlands as well as for other types.
- There need to be “Ecosystem Goals” for seasonal wetlands.

3. Invasive Species and Wetlands:

- Language needs to be added to the Problem Statement on invasive species on page 108, top paragraph to include “intentional or unintentional introduction of invasive species.”
- Needs New Objective in Wetlands section as related to restoration or mitigation projects.
- Need new Action item under Objective #4 (p. 120) to address Invasive Species in restoration or mitigation projects.
- BCDC Bay Plan includes language for tidal marshes in section 6.
- No species list desired.
- State AIS Plan will rank species for action (draft available June). Should link CCMP language to state plan.
- Any regional difference worth noting? Address Lepidium? (Ice Plant)

**Volunteers** to draft language: **Nicole and Karen.**

4. Methyl Mercury and Wetlands: Although Pollutants Group is addressing, it was felt there should be mention in Wetlands section as well. BCDC has put together language on

what should go into a restoration project as well as a policy document on pollutants. There should be a new action with BCDC's language under Objective WT-4. **Nicole** volunteered to put together something on "Tidal restoration project criteria" based on the BCDC language.

New Action: WT-4. \_\_\_ Expand language to include more project specific requirements like BCDC uses, but still need to add MeHg here. Change BCDC tidal restoration criteria to wetland restoration criteria.

5. Research/Monitoring/Data Management: There was discussion on the fact that project monitoring is still not being done very well and is still a challenge. Need to point out in management structure update what exists, new programs underway -- RAMS, WEAM (Wetland Ecological Assessment Method). Advertise what exists; trends in accretion, erosion; baseline monitoring. Volunteers: **Anitra and Andree**.
  - Add specific item on wetlands monitoring to both Wetlands section and Research and Monitoring section.
  - Ensure coordination among tracking systems.
  - SFEI's Wetlands tracker expanding into watersheds.
  - What are the trends in marsh accretion, etc?
  - Encourage local academic institutions and SFEI to study wetlands.
  - Need strategic baseline monitoring to track wetland health—needs agency support.
  - Where do indicators fit in?
  - Need to establish long term monitoring sites to use as reference sites and to report as a performance measure.
6. Sea Level Rise:
  - Add to Research and Monitoring chapter.
  - Needs to consider how will sediment supply interface with sea level rise.
  - Example, Bolinas Lagoon—important to use a range of change.
  - Need to say more than just plan for sea level rise in projects.
  - Suggest estuarine research on impacts of sea level rise and climate change; temperature of water affects fish.
  - Add something to Problem Statement and section 4 in Wetlands.
  - BCDC has adopted language in their Work Program on global climate change—Steve McAdam will send.
  - Need long term planning—buying uplands for wetlands to go when sea level rises.
7. Mitigation: Briefly discussed references in April 11 Meeting Summary. Need to relate to local impacts; flood control, tourism, recreation, education, environmental justice. National Wetlands Newsletter. Page 74 of BCDC Bay Plan. –Tabled for further discussion.
8. Stream Protection Policy: Alternatives out for public review this fall. Watershed group also looking at adding language. Wetlands would like to review their language.

Because of time constraints, discussion on items 9 (Wetlands Restoration Master Plan), 10 (Delta Wetlands), 11 (Public Involvement) and 7 (Mitigation) was postponed until the next meeting.

**NEXT MEETING: MONDAY, JULY 17, 2006: 1-4 PM: ROOM 1411 WATER BOARD**

**Assignments:**

**WT-1.2: Beth and Chris P.**

**WT-2.3: Andree, Arthur, Chris P.**

**WT-3.1: Beth**

**WT-4.1: Beth, Chris P.**

**New Actions:**

- 1. Buffers/transitional habitats: Anitra, Andree, Drew, Arthur**
- 2. Seasonal wetlands/vernal pools: Barbara, Arthur**
- 3. Invasives: Nicole, Karen**
- 4. MeHg: Nicole, Steve**
- 5. Research: Anitra, Andree**

## **CCMP UPDATE – WETLANDS WORKGROUP MTG #3**

Monday, July 17, 2006, 1:00 PM

Room 1411, State Building, 1515 Clay Street, Oakland

### **MEETING SUMMARY**

Present: Mike Monroe, Luisa Valiela, Andree Breaux, Nicole Dobroski, Arthur Feinstein, Beth Huning, Steve McAdam, Anitra Pawley (phone), Barbara Salzman, Marcia Brockbank, Paula Trigueros.

The meeting began with a round table of introductions.

Report on Facilitator's Meeting of June 30, 2006 (Marcia): There was discussion of the timing/process for CCMP Update approval. (This was later revised somewhat after the August IC meeting; revised plan follows). At the November 3, 2006 IC meeting, work group facilitators will make a presentation summarizing the progress of the update for their topic area and introducing new and potentially controversial items to the IC so when the actual "preliminary" submittal of the update at IC meetings (beginning in February and continuing through June) is made, IC members will be aware of what's coming. There will need to be a detailed memo in the November IC packet which goes out mid-October of each workgroup's efforts. The facilitator's committee (now Steering Committee) will track the progress of the workgroups and determine a schedule for the review process. The IC will vote to accept the Update at a second presentation of the amended chapter. The entire Update document will go to the IC in June 2007 and also to the Executive Council.

### **Update on New/ Revised Items**

**Action WT 1.2: Encourage geographically focused cooperative efforts to protect wetlands.** Beth Huning and Chris Potter are working on revision. Cost is up to \$345 million.

**New Action (1.3?) Buffers/transitional habitats-** Drew sent out an email on July 17. Drew and Anitra need to re-draft. Drew's email language was as follows:

Maintain habitat connectivity and ecosystem integrity for wetland habitats.

Ecological function of habitats is often driven by interactions between and among nearby systems. In wetland habitats, this connectivity takes two major forms: the interaction with nearby non-wetland habitats (transition zones/buffers), and the interaction among spatially distinct wetland habitats that form a mosaic.

Transition areas between habitat types (such as the wetland/upland transition) are not only of critical importance due to their ability to modify impacts from nearby habitats ("buffer"), but also have intrinsic value as habitat for endangered and threatened species. It serves us to differentiate between "buffers" (which broadly are thought of as ameliorating the effects of human activities), and transition zones, which are essentially boundaries between (usually natural) habitats.

Then I think we need to make actions that take into account, in mitigation, restoration, and preservation plans, the value of maintaining natural habitat connectivity, whether within a mosaic of similar habitats or across boundaries between adjacent habitat types (e.g., upland/wetland, intertidal/subtidal, etc).

**New Action (1.4?) Seasonal Wetlands/Vernal Pools-**Action Item needs to be drafted. Barbara and Arthur will work on this item. (Refer to discussion in workgroup meeting summary of May 31, 2006). Need definition of seasonal wetlands.

**New Action ( 4.2?) Invasive Species and Wetlands.** Nicole submitted draft language:

**Action WT – 4.2?**

**Prevent the introduction and establishment of non-native species in wetland restoration and mitigation projects.**

**Who:** California Department of Fish and Game, U.S. Fish and Wildlife Service, NOAA Fisheries, California Department of Food and Agriculture, State Water Resources Control Board, San Francisco Bay Regional Water Quality Control Board, private non-profit organizations, public trusts.

**What:** Non-native species should not be used in habitat restoration and mitigation projects. All approved mitigation and restoration projects should include a program for periodic site monitoring for non-native species and a program for control and, if appropriate and feasible, eradication should an introduction occur. The use of non-native plant species in public access landscape improvements should be avoided where a potential exists for non-native plants to spread into the Bay, other waterways, or transition zones between tidal and upland habitats. Programs and outreach materials should be developed to educate stakeholders (individuals and groups involved in wetland monitoring, restoration and mitigation) about the impacts of species introductions and what they can do to prevent them.

**When:** Immediately

**Cost:** ??

**Performance Measure:**

Need to complete cost and performance measure.

**New Action ( 4.3 ???) Methyl mercury.** Nicole submitted draft language:

**Action WT – 4.3?**

**Identify, study and control sources of mercury methylation in wetland restoration and mitigation projects.**

**Who:** State Water Resources Control Board, San Francisco Bay Regional Water Quality Control Board, Army Corps of Engineers, CALFED, private non-profit organizations, public trusts.

**What:** Any tidal restoration project should include clear and specific long-term and short-term biological and physical goals, and success criteria and a monitoring program to assess the

sustainability of the project. Design and evaluation of the project should include monitoring and management of mercury methylation and sediments with contaminants as a result of wetland restoration and/or mitigation. If success criteria are not met, appropriate corrective measures should be taken.

**When:** As soon as feasible.

**Cost:** ??

**Performance Measure:**

### **New Objective WT-5: Monitoring and Tracking of Wetlands Restoration projects**

Nicole presented language for success criteria:

#### **New Action 5.1 (???) Identify and establish success criteria for wetland restoration and mitigation projects.**

**Who:** State Water Resources Control Board, San Francisco Bay Regional Water Quality Control Board, Army Corps of Engineers, CALFED, California dept. of Fish and Game, US Fish and Wildlife Service, NOAA Fisheries.

**What:** Any wetland restoration project should include clear and specific long-term and short-term biological and physical goals, and success criteria and a monitoring program to assess the sustainability of the project. Design and evaluation of the project should include an analysis of: (a) the effects of relative sea level rise; (b) the impact of the project on the Bay's sediment budget; (c) localized sediment erosion and accretion; (d) the role of tidal flows; (e) potential invasive species introduction, spread, and their control; (f) rates of colonization by vegetation; (g) the expected use of the site by fish, other aquatic organisms and wildlife; (h) site characterization; and (i) mercury methylation in wetland sediments. If success criteria are not met, appropriate corrective measures should be taken.

**When:** As soon as feasible.

**Cost:** ????

**Performance Measure:**

Andree presented language for monitoring (moved to chapter as new action under new Objective 5 from original monitoring chapter RM 2.1):

**New Action 5.2 (???). Develop a Regional Wetland Monitoring Program (WRMP) that will establish wetland indicators and standardized methods for the collection of baseline data at both natural wetland reference sites and restored/created/enhanced sites. The WRMP should follow the San Francisco Estuary Institute's RMP model and also provide an inventory of all wetland and riparian habitats in San Francisco Bay, a GIS database for locating and tracking all relevant information about wetland projects (both regulated and**

**non-regulated), and standardized methods for assessing wetland condition (such as CRAM or WEA).**

Anitra wants to add more to Andree's draft; monitoring for conditions; enforcement component; adaptive management. She also felt this action should be included under a New Objective WT-5 for monitoring, research and enforcement. Need additional action items and text. Committee to work on this item: Anitra, Andree, Arthur, Josh, Shin-Roei.

**New Action- Sea Level Rise:** Steve McAdam emailed BCDC language on global climate change:

As noted yesterday, BCDC's Strategic Plan contains as an objective:

**"Increase understanding of how global climate change will affect the Bay."**

**As tasks under that objective, the Strategic Plan directs the staff to: (1) develop a work program for researching the impacts of global climate change on the Bay and sharing this information with relevant institutions and organizations; (2) report to the Commission on the major impacts on the Bay and issues associated with global climate change; (3) develop an effective mechanism for informing local governments, stakeholders, planning bodies, and the public in the Bay Area of the potential impacts of and the best approach or dealing with global climate change; and (4) provide for the Commission's consideration any needed revisions to the Bay Plan pertaining to global climate change.**

This language is a bit clunky and obviously oriented just to the Bay, but perhaps it can be the basis for developing language on global climate change that would be suitable for the entire estuary and inclusion in the CCMP.

DWR also released a report on climate change recently. CCMP should recommend an analysis as tidal wetlands are submerged, where would new tidal wetlands be. Group wants to wait for BCDC work plan due in a few months . . . can take bullet points and see if we can condense into an action item

**NOTE: At the beginning of each Program Area there will be an Introduction which will state what was tried and what was not successful.**

**New Action: Stream Protection.** Andree will work with Ben Livsey. (Also may be included in Watershed program area).

**Mitigation :** Andree presented revised text for Action WT-2.3 which is enclosed at the end of this meeting summary. There was a long discussion on basing mitigation on watershed plans (401 or 404) and what is needed in watershed planning. Watershed planning must be based on hydrologic functions. There should be a formal delineation of watersheds depending on

contiguous habitat. A regulator looking at mitigation for a project must evaluate the impacts and constraints of the project. Knowland vs. Coastal Commission determined the proportionality towards mitigation projects. BCDC has updated its policy to allow out-of-kind mitigation but near impact site. Watershed plans allow off-site, out-of-kind mitigation. Effort to define a good watershed plan—often completed by flood control districts or friends groups concurrent with fish or riparian restoration. Corps regulations state mitigation must be in a plan by a government agency or approved by a government agency.

Watershed planning must include mitigation for wetlands. Arthur will include in mitigation (what makes a good watershed plan). Off-site ratios should be higher.

Need to add regional tracking mechanism for habitat types.

**Wetlands Restoration Master Plan:** There should be mention of coordinating wetlands restoration planning with other regional planning efforts underway. There should be an action item relating the Joint Venture to Wetlands Restoration Master Plan—implementing the Habitat Goals Report.

The group agreed a Wetlands Restoration Master Plan does not need to be prepared. Although there is no coordinated tracking of the pieces because there is not a master plan—there should be a way to ensure it's happening. The framework of the original CCMP Wetlands chapter was the first call for an overall plan; acquisition; monitoring. There are now goals projects underway for subtidal parts of the Estuary, and for uplands (including isolated and seasonal wetlands). URL is [www.openspacecouncil.org](http://www.openspacecouncil.org)

**Public Involvement:** Need to develop and include information supporting economic value of wetlands. Goal is to make wetland information as accessible as possible. Compile and publicize functions and values of wetlands, as habitats, for recreation.

**Delta Wetlands:** Delta vision should take into consideration wetland protection actions set forth in this chapter. CCMP needs to capture 3 things: 1) Delta wetlands are disappearing; 2) Need to make Delta Protection Council more effective; 3) Need a Delta Conservancy. Information regarding disappearing Delta wetlands needs to be added to Wetlands chapter introduction. Wetlands group facilitators will coordinate with Land Use and Watershed Management group.

**Performance Measures:** Need to develop straw-man performance measure. One suggestion: for action that agencies adopt a permit requirement to ensure no new invasive species; the # of permits. For reduce the amount of native Spartina...# acres sprayed. Models for performance measures: 1) Reduce pressures on system; 2) Relate to objectives; 3) Influence management response (these are condition variables; need condition measures). Luisa, Anitra and Steve will work on performance measures.

**NEXT MEETING: TUESDAY, SEPT. 26, 2006, ROOM 1411, REGIONAL WATER BOARD**

## **NOTES FROM CHARTS:**

### **Mitigation**

- Add items under mitigation actions WT 2.3 etc.
- Mitigation Banks—we don't all agree
- Mitigation ratios—how to address?
- Do we support a Watershed Planning Process for mitigation? (Is this the Action?) (Arthur: watershed plan has to be 401/404 based)
- Catch (Barbara) the plans have to be produced by a government agency (NEED TO CHECK THIS) \*\*\*
- Watersheds in tidal areas more complicated than upper watersheds and could maybe allow for “slop-over”
- BCDC bound by nexus/Supreme Court decision to have mitigation related to impact site; recent exception allowing mitigation ACL : to “Goals Report”
- Are also some off-site exceptions
- Do we want stakeholders to participate in establishing guidance to what a Watershed Plan should look like?
- Advise that there be a tracking system for mitigation sites, acreage, types, etc.
- How is this difference from Joint Venture implementation?
- IRWMP-special projects are listed; how are the projects prioritized and make it on “the list”? Funding is coming from Prop 50.
- Should action focus on coordination by IRWMP and other restoration funding rather than master planning?
- Does this tie into Uplands Habitat Goals? Marcia: They are writing an action that will be in the Watershed Chapter---review that---Make sure Uplands project will look at seasonal wetlands.
- Expand WT-1.2 as an action that related to the Joint Venture?
- If tidal is “taken care of,” should focus be on upland watershed wetlands (streams, seasonal, isolated wetlands)?
- Action would say this is a good thing to do
- Restoration Master Plan is dead
- Beth/JV will track progress of uplands goals project—concern that product will lack scientific rigor that ecosystem goals project had.
- Action should say we recommend the same process for seasonal goals as happened for ecosystem goals.
- Update should include economic value of wetlands
  - Compile existing information related to recent valuations; lots of agencies already doing this---but NGO's say the information is not readily available---what's available? Online or hard copy—either would suffice.
- JV is pulling information together and putting it on their website.
- Action would be to compile and publicize economic value to make it better known.

**DELTA**

- Delta/Land Use workgroup already working on this...review their work?
- Bay-Delta Authority/Delta Protection Commission ought to take into account what we recommend related to wetlands.
- Still have mention of Delta in our chapter as well at the Land Use chapter.
- “Delta wetlands are disappearing, so we recommend....”
- Delta Protection Commission—needs more “teeth”
- Need Delta Conservancy
- DWR/BDA/McPeak—Delta Visioning Process

**Andree's Revision of Current Action Items:**

**Action WT-2.3: *Develop and adopt uniform compensatory mitigation policies*** (pp. 115-116):

Who: [see page 115]

What: No net loss should first be accomplished by avoiding destruction or degradation of wetlands, if possible, then by minimization of adverse impacts and by compensatory mitigation. **When avoidance is not possible, then compensatory mitigation projects should be planned and implemented in a watershed context to assure that wetland functions such as flood control, water quality improvement, and wildlife habitat are maintained or increased.** The relevant agencies should enter into a MOA regarding compensatory mitigation for wetland losses within the Estuary, including the establishment of mitigation banks for small wetland fills. **[There was an MOA on mitigation banking signed by some but not all of the relevant agencies and presented to the BCDC Board in 1998.]** The MOA should incorporate the following criteria concerning a) compensatory mitigation and b) mitigation banking.

A. Compensatory mitigation

1. Mitigation should create **or restore** new wetlands at the site of the wetland alteration; if on-site mitigation is not feasible, then mitigation should create new wetlands as close as possible **or at locations within the watershed selected to optimize wetland functions;**
2. Mitigation must be commensurate with adverse impacts of the wetland alteration and consist of providing similar functions and greater wetland acreage than those of the wetland area adversely affected. **If wetland mitigation is provided off-site, ratios should be higher than for on-site AND some land (can be vegetated grassy swales) should be left at the impact site to provide hydrologic storage and water quality improvement functions; habitat can then be increased at the off-site location;**
3. Mitigation should include an area of adjacent upland habitat for wetland species that require such habitat **and some credit should be given for including it;**
4. Mitigation should, to the extent possible, be provided prior to or concurrently with those parts of the project causing the adverse impacts; mitigation should be carefully planned so as to endure success, permanence, and long-term maintenance;
5. Mitigation for wetland destruction should be implemented on a currently non-wetland site; and
6. Mitigation sites should be permanently guaranteed for open space and wildlife habitat purposes **and provide maintenance and control of invasive exotic species.**

**7. Mitigation sites should consider landscape context and hydrologic source to assure permanence.**

All permitting agencies should develop standardized requirements for compensatory mitigation plans and monitoring to ensure the success of mitigation projects. Requirements should be developed to address minimum reporting criteria, environmental assessments, and clearly defined goals and success criteria for the mitigation area, including a contingency plan in the event of partial or complete failure of the plan.

**Mitigation sites should be tracked in Geographic Information Systems (GIS) along with all known wetland and riparian sites including restoration, creation, enhancement, preservation, and existing natural wetland sites. This will assist with sound watershed planning and allow efficient monitoring and enforcement.**

**Completed mitigation projects should be assessed with standardized rapid methods such as the California Rapid Assessment Method (CRAM) or the Wetland Ecological Assessment (WEA) method which can be conducted along with wetland jurisdictional delineations when mitigation projects are completed to determine overall compliance and ecological success.**

**B. Mitigation Banking [Art Feinstein will be updating this section; my comments are bold]**

1. Projects qualifying for mitigation banks should be limited to small fills in order to ensure the availability of adequate mitigation sites for the small project sponsor;
2. The mitigation bank site should be within the same segment of the Estuary as the wetland alteration; **[consider doubling ratio for offsite mitigation: higher at offsite location where wetland restoration/creation will be the goal but will require that some vegetated area remain on site for flood control and water quality enhancement.]**
3. Use of a mitigation bank should be authorized only after it is successfully functioning and providing in-kind habitat values; and **[yes but very expensive]**
4. The mitigation bank should be used only if the fill project would otherwise meet criteria specified in the CWA Section 404(b) (1) Guidelines.

When: 1993

Cost: \$185,000 estimated total (\$10,000 federal and \$75,000 state)

II. Action WT-4.1: *Identify and convert/restore non-wetland areas to wetland- or riparian-oriented wildlife habitat. Purchase non-wetland areas to create wetlands. This action should be guided by and consistent with the Regional Wetlands Management Plan.* (page 120)

**[Add new bullet on WT 4.1]:**

**Develop and implement regional wetland monitoring plans and programs to assure that restored wetlands currently owned mostly by public agencies are providing anticipated functions (i.e., wildlife habitat; hydrologic storage; water purification; buffers for storms and sea level rise; and public recreation and education). Support existing monitoring and research and conduct new research on wetland status and change throughout the San Francisco Bay ecosystem.**